

**DEPARTMENT OF ENERGY
BONNEVILLE POWER ADMINISTRATION**

**Notes - Fish and Wildlife Investments Crosscut Tables
Fiscal Years 1978 through 1995**

These notes support three tables that display the Pacific Northwest electric utility ratepayers' investment in fish and wildlife activities within the Columbia River Basin. The tables represent the annual expense for all fish and wildlife investments funded under the Federal Columbia River Power System from a rate making, revenue requirement perspective for the period Fiscal Years (FY) 1978 to 1995. Where audited actuals are not available in this period, best estimates are used. The three tables cover the following periods: Table 1 - FY 1978 through FY 1984, Table 2 - FY 1985 through FY 1990, and Table 3 - FY 1991 through FY 1995.

The costs shown in the tables are based on budget outlays (rather than obligations) for the year shown. The title "Capital Investments," shown at the top of the table, is presented for information only. The annual expense (interest, amortization, and depreciation) associated with these capital investments is shown under the title "Program Related Fixed Expenses."

BPA has a mandate, under the Pacific Northwest Electric Power Planning and Conservation Act (Northwest Power Act), to undertake activities to enhance and support fish and wildlife resources adversely affected by the hydroelectric development of the Columbia River Basin. Under the Act, the Northwest Power Planning Council has established a fish and wildlife program that oversees regional efforts to improve fish and wildlife survival. In conjunction with the Power Planning Council, affected states within the BPA service area, public agencies and Indian tribes, BPA identifies opportunities for effective actions to restore habitat and support fish and wildlife population, and provides funding for those activities.

BPA also has a mandate to implement measures called for under the Endangered Species Act. These measures are part of the Biological Opinions (BO) issued by the National Marine Fisheries Service (NMFS) and the U.S. Fish and Wildlife Service (USFWS) regarding the operations of the Federal Columbia River hydro electric system. The expenses associated with the calendar year (CY) 1995 NMFS BO, addressing measures regarding listed salmon species, and the CY 1995 USFWS BO, addressing measures concerning Kootanai River sturgeon and certain Snake River snails, are reflected in the tables.

BPA funding of the Power Planning Council's Fish and Wildlife Program measures and measures called for under ESA, starting in FY 1992, has increasingly become interrelated and as such, difficult to separately track. As a result, the ESA activities reported under the heading "BPA Direct Fish and Wildlife Program" will no longer be separated in forecasts that extend beyond the budget year.

BPA has a direct program "budget" that is the source of funding the Council's Fish and Wildlife Program and certain ESA measures called for in Biological Opinions. This budget is reflected in these tables under two headings. The first is under "Capital Investments" for fish and wildlife, and the second is under "Program Operating Expenses" for BPA fish and wildlife program. (Because these tables present a "revenue requirement" view of BPA's overall fish and wildlife annual investment, only the fixed expenses of the capital investment are included in the total, as noted above.)

Adjustments for implementation of Section 4(h)(10)(C) of the Northwest Power Act for FY 1994 and FY 1995 are \$18.7 million and \$56.3 million, respectively, are not reflected in Table 3. The Section 4(h)(10)(C) credits were received against BPA's FY 1994 and FY 1995 Treasury repayment. The credit reflects implementation of Section 4(h)(10)(C) which calls for a portion of BPA's fish and wildlife expenses to be allocated to the other purposes of the Federal projects in the Columbia River Basin. Analysis has determined that the BPA's power share is 73 percent and the taxpayer's share is 27 percent.

- The tables represent a "revenue requirement" view of BPA's fish and wildlife funding responsibilities except for foregone revenues. All expenses in these tables are paid for by BPA's ratepayers.
- Power purchases and foregone revenues for FY 1994 reflect the measures contained in the CY 1994 National Marine Fisheries Service's (NMFS) Biological Opinion issued March 16, 1994, pursuant to the Endangered Species Act (ESA). Estimates for FY 1995 reflect the average of 50 water year conditions and reflect the measures contained in the NMFS Biological Opinion issued March 2, 1995, pursuant to ESA. The estimated expenses for FY 1995 are split 50/50 between power purchases and foregone revenues. A detailed accounting of FY 1995 expenses is not complete at this writing but should be included in later updates to Table 3. A format change in the display of the Power Purchases for Fish Enhancement and Foregone Revenues occurs starting in FY 1994 to better reflect NMFS Biological Opinion elements.

Footnotes

1/ Based on outlays. The BPA Program Expenses - ESA for the period FY 1991 through FY 1995 reflect funding specifically mandated by ESA and also those expenditures that, while not specifically mandated, are intended to assist in the recovery of ESA-listed species. Examples of these projects are the squawfish predator control program and the Kootanai River sturgeon program.

2/ Based on plant-in-service as reported by the Corps of Engineers. Through FY 1977, cumulative plant-in-service is estimated at \$165 million. A review of these annual estimates is planned and may result in restatements of annual plant-in-service and resulting adjustments in Program Related Fixed Expenses.

3/ Expenses through FY 1991 are for Water Budget only. ESA implementation began in FY 1992 in anticipation of NMFS listings that led to a Biological Opinion that was issued in calendar year (CY) 1993.

4/ In FY 1993, estimates reflect the CY 1993 NMFS Biological Opinion.

5/ The FY 1994 estimates reflect the measures contained in the 1994 NMFS Biological Opinion issued March 16, 1994. Estimates for FY 1995 reflect NMFS Biological Opinion issued March 2, 1995, and are the average of 50 water year conditions. As noted above, accounting is not complete on FY 1995 hydro operations. Effective in FY 1994, these expenses are displayed with greater detail, consistent with categories identified by NMFS in the Biological Opinion.

6/ The estimate for FY 1994 reflects CY 1994 NMFS Biological Opinion spill levels April 10, 1994, through the migration period. It also reflects emergency spill measures implemented by NMFS May 11, 1994 through June 20, 1994.

7/ The estimate for FY 1994 reflects CY 1994 NMFS Biological Opinion flow augmentation volumes plus the additional releases from Dworshak (to elevation 1490 feet) and Upper Columbia reservoirs (1.33 MAF).

8/ Associated Projects costs reflect the power share of the fish and wildlife O&M reimbursed to the Treasury. The amounts shown are based on estimates of the agency, adjusted for actuals by BPA where data is available. (Prior versions of these tables included a line representing estimates for "ESA" related expenses for FY's 1992 and 1993. This sub-category has been removed because expenses are not separately reported to Bonneville, although ESA expenses are assumed to be imbedded in the expenses of the Federal agencies [excluding the Council which has no ESA related expenses.]

9/ Interest expense includes BPA's interest on bonds (for fish and wildlife) and interest on the Corps of Engineers (Federal) investment in fish and wildlife assigned to the power purposes of the Federal projects. Amortization reflects BPA's bonds and depreciation reflects the Federal investment in fish and wildlife. These amounts include expenses for interest during construction on federal investments.

10/ "ESA drawdown" includes operations of the four Lower Snake River dams at near minimum operating pool elevations and John Day Dam at minimum irrigation pool, as in 1992. Other drawdown proposals being studied include physical changes to the Lower Snake River dams. These proposals would result in significantly higher costs and are not included in either the ESA drawdown or reduced forebay levels in these tables.